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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/574,113	12/29/2006	Joung-Hyeon Lim	8947-000177/US	7430
30593 7590 11/18/2009 HARNESS, DICKEY & PIERCE, P.L.C. P.O. BOX 8910			EXAMINER	
			COLEMAN, RYAN L	
RESTON, VA 20195			ART UNIT	PAPER NUMBER
			1792	
			MAIL DATE	DELIVERY MODE
			11/18/2009	PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

	Application No.	Applicant(s)					
Office Action Comments	10/574,113	LIM ET AL.					
Office Action Summary	Examiner	Art Unit					
	RYAN COLEMAN	1792					
The MAILING DATE of this communication app Period for Reply	ears on the cover sheet with the c	orrespondence ad	dress				
A SHORTENED STATUTORY PERIOD FOR REPLY WHICHEVER IS LONGER, FROM THE MAILING DATE - Extensions of time may be available under the provisions of 37 CFR 1.13 after SIX (6) MONTHS from the mailing date of this communication. If NO period for reply is specified above, the maximum statutory period value - Failure to reply within the set or extended period for reply will, by statute any reply received by the Office later than three months after the mailing earned patent term adjustment. See 37 CFR 1.704(b).	ATE OF THIS COMMUNICATION 36(a). In no event, however, may a reply be tim vill apply and will expire SIX (6) MONTHS from a cause the application to become ABANDONE	J. lely filed the mailing date of this α ○ (35 U.S.C. § 133).					
Status							
1) Responsive to communication(s) filed on							
	action is non-final.						
3) Since this application is in condition for allowar		secution as to the	merits is				
•	closed in accordance with the practice under <i>Ex parte Quayle</i> , 1935 C.D. 11, 453 O.G. 213.						
Disposition of Claims							
·							
· · · · · · · · · · · · · · · · · · ·	Claim(s) <u>1-40</u> is/are pending in the application.						
5) Claim(s) is/are allowed.	4a) Of the above claim(s) is/are withdrawn from consideration.						
6) Claim(s) is/are allowed.							
7) Claim(s) is/are rejected.							
8) Claim(s) 1-40 are subject to restriction and/or	election requirement						
o) Claim(s) 1-40 are subject to restriction and/or 6	siection requirement.						
Application Papers							
9)☐ The specification is objected to by the Examine	r.						
10)☐ The drawing(s) filed on is/are: a)☐ accepted or b)☐ objected to by the Examiner.							
Applicant may not request that any objection to the	Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).						
Replacement drawing sheet(s) including the correct	ion is required if the drawing(s) is obj	ected to. See 37 CF	FR 1.121(d).				
11)☐ The oath or declaration is objected to by the Ex	aminer. Note the attached Office	Action or form PT	O-152.				
Priority under 35 U.S.C. § 119							
12) △ Acknowledgment is made of a claim for foreign a) △ All b) ☐ Some * c) ☐ None of: 1. △ Certified copies of the priority documents	s have been received.						
2. Certified copies of the priority documents	• • • • • • • • • • • • • • • • • • • •	·	Ota				
	3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).						
* See the attached detailed Office action for a list		d					
Gee the attached detailed Office action for a list	or the certified copies not receive	u.					
Attachment(s)							
1) Notice of References Cited (PTO-892)	4) Interview Summary	(PTO-413)					
2) Notice of Draftsperson's Patent Drawing Review (PTO-948)	Paper No(s)/Mail Da	ite					
3) Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date	5) Notice of Informal P 6) Other:	атент Аррисацоп					

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DETAILED ACTION

Election/Restrictions

- 1. Restriction is required under 35 U.S.C. 121 and 372.
- 2. This application contains the following inventions or groups of inventions which are not so linked as to form a single general inventive concept under PCT Rule 13.1.
- 3. In accordance with 37 CFR 1.499, applicant is required, in reply to this action, to elect a single invention to which the claims must be restricted.

Group 1, claim(s) 1-33, drawn to a substrate cleaning facility.

Group 2, claim(s) 34-40, drawn to a method of cleaning substrates in a cleaning facility.

- 4. The inventions listed as Groups I and II do not relate to a single general inventive concept under PCT Rule 13.1 because, under PCT Rule 13.2, they lack the same or corresponding special technical features for the following reasons: the common special technical feature of the two groups is taught in the prior art. The special technical feature between the two groups is the use of a cleaning facility comprising a cleaning part that includes a multi-storied structure comprising a plurality of stacked process chambers having at least one process bath in which substrates are cleaned and a transfer robot. This special technical feature is taught by U.S. Patent No. 6,478,035 to Niuya et al. (hereafter referred to as "Niuya").
- 5. Niuya teaches a substrate cleaning facility comprising a cleaning part that includes a multi-storied structure comprising a plurality of stacked process chambers (items 22A-22D) and a transfer arm (item 26 in Figure 1; reads on *transfer robot*; Col. 1,

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line 66 to Col. 6, line 11; Figure 1). As taught by Niuya, each of the stacked process chambers has a bath in which a substrate is immersed in flowing cleaning liquid and exposed to ultrasonic agitation (Col. 7, line 35 to Col. 8, line 34; Figure 3).

- 6. A telephone call was made to John Castellano on November 9, 2009 to request an oral election to the above restriction requirement, but did not result in an election being made.
- 7. Applicant is advised that the reply to this requirement to be complete must include (i) an election of a species or invention to be examined even though the requirement may be traversed (37 CFR 1.143) and (ii) identification of the claims encompassing the elected invention.
- 8. The election of an invention or species may be made with or without traverse. To preserve a right to petition, the election must be made with traverse. If the reply does not distinctly and specifically point out supposed errors in the restriction requirement, the election shall be treated as an election without traverse.
- 9. Applicant is reminded that upon the cancellation of claims to a non-elected invention, the inventorship must be amended in compliance with 37 CFR 1.48(b) if one or more of the currently named inventors is no longer an inventor of at least one claim remaining in the application. Any amendment of inventorship must be accompanied by a request under 37 CFR 1.48(b) and by the fee required under 37 CFR 1.17(i).

Conclusion

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10. Any inquiry concerning this communication or earlier communications from the examiner should be directed to RYAN COLEMAN whose telephone number is (571)270-7376. The examiner can normally be reached on Monday-Friday, 9-5.

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- 11. If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Michael Kornakov can be reached on (571)272-1303. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.
- 12. Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/RLC/ Ryan L. Coleman Patent Examiner, Art Unit 1792 November 10, 2009

/Michael Kornakov/

Supervisory Patent Examiner, Art Unit 1792